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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/567,968	11/28/2006	Koichi Otsuki	060131	7177
23850 7590 08/13/2010 KRATZ, QUINTOS & HANSON, LLP 1420 K Street, N.W. 4th Floor WASHINGTON, DC 20005				
EXAMINER				
PURDY, KYLE A				
ART UNIT		PAPER NUMBER		
1611				
MAIL DATE		DELIVERY MODE		
08/13/2010		PAPER		

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/567,968

Applicant(s)

OTSUKI ET AL.

Examiner

Kyle Purdy

Art Unit

1611

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 04 June 2010.
2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-16 is/are pending in the application.
4a) Of the above claim(s) 1-4 and 8-16 is/are withdrawn from consideration.
5) ☐ Claim(s) _____ is/are allowed.
6) ☒ Claim(s) 5-7 is/are rejected.
7) ☐ Claim(s) _____ is/are objected to.
8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/22)
4) ☐ Interview Summary (PTO-413)
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____
Paper No(s)/Mail Date _____

DETAILED ACTION

Status of Application

1. The Examiner acknowledges receipt of the amendments filed on 06/04/2010 wherein claims 6 and 7 have been amended and claim 16 is newly added.
2. Claims 5-7 are presented for examination on the merits. The following rejections are made.

Election by Original Presentation

3. Newly submitted claim 16 directed to an invention that is independent or distinct from the invention originally claimed for the following reasons: it's directed to a method or providing antiviral benefit rather than to a composition.
4. Since applicant has received an action on the merits for the originally presented invention, this invention has been constructively elected by original presentation for prosecution on the merits. Accordingly, claim 16 is withdrawn from consideration as being directed to a non-elected invention. See 37 CFR 1.142(b) and MPEP § 821.03.

Response to Applicants' Arguments

5. Applicants arguments filed 06/04/2010 regarding the rejection of claims 5-7 made by the Examiner under 35 USC 102(b) over Crowell (US 1577450), evidenced by Felder-Casagrande et al. (J. Thermal Analysis, 1997, 47, 971-978) have been fully considered but they are not found persuasive and are **MAINTAINED** for the reasons of record in the office action mailed on 03/04/2010.

6. In regards to the 102(b) rejection, Applicant asserts the following:

A) Crowell does not anticipate the instant claims because Crowell does not disclose the calcined partially hydrated dolomite as a powder. In fact, Crowell is directed to bentonite, not dolomite.

7. In response to A, Applicants arguments are not persuasive. Powder, as defined by dictionary.com, is any solid substance in the form of tiny loose particles. Crowell states that the mineral materials provided onto their fabric are “finely divided” and “colloidal”. So, although not specifically using the word “powder” any ordinary person would envisage a colloidal mineral composition as being synonymous with a mineral powder. Applicant is also directed to “Physical analysis” section of Crowell (see column 2, lines 75-85). With respect to the argument that Crowell is directed to providing bentonite onto the fabric, this feature is acknowledged. However, bentonite is an aluminum phyllosilicate consisting mostly of montmorillonite $(\text{Na,Ca})_{0.33}(\text{Al,Mg})_2(\text{Si}_4\text{O}_{10})(\text{OH})_2$ and other trace elements (see Wikipedia). Accordingly, neither bentonite nor montmorillonite comprise either lime or magnesia. It should also be noted that the instant claims are generically directed to a product of a reaction [e.g. calcination of dolomite]. The Examiner has had to rely on an evidentiary reference to know what such a product comprises (see Felder). Felder shows that calcined dolomite produces lime and magnesia. These products are believed to be the objects of the instant claims. This belief is also supported by Applicants acknowledgement of such (see response, page 7). Accordingly, *any* fabric composition comprising these two components would meet Applicants current claims. It is also pointed out to Applicant that they recite open claim language [“comprising”] and the claims are inclusive to components not specifically [i.e. silica and alumina (bentonite)]. And, it’s

acknowledged that bentonite is not dolomite, however Applicant is not claiming dolomite they are claiming the partial hydration of *calcined* dolomite which is something completely different.

Maintained Rejections, of Record
Claim Rejections - 35 USC § 102

8. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless --

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

9. Claims 5-7 are rejected under 35 U.S.C. 102(b) as being anticipated by Crowell (US 1577450; published 06/11/1923), evidenced by Felder-Casagrande et al. (J. Thermal Analysis, 1997, 47, 971-978).

10. Crowell is directed to coated fibrous articles to form coated cloth or paper (i.e. a sheet). Fabric is to be coated with an aqueous suspension of bentonite clay, said bentonite clay comprising lime (CaO) and magnesia (MgO) (see column 2, lines 60-65).

11. Felder is directed to calcination (heating to induce decomposition) of limestone. In addition to calcination of limestone, calcination of dolomite is discussed. Calcination of dolomite results in the production of carbon dioxide (gas), lime and magnesia (see page 976). Thus the results of the calcination of dolomite results in the agents provided by Crowell onto their fabric.

12. With respect to the limitation that the decomposition products of dolomite possess antiviral benefit is an inherent property which Crowell would necessarily possess. Artisans of ordinary skill may not recognize the inherent characteristics or functioning of the prior art. However, the discovery of a previously unappreciated property of a prior art composition, or of a

scientific explanation for the prior art's functioning, does not render the old composition patentably new to the discoverer. The Court further held that this same reasoning holds true when it is not a property but an ingredient which is inherently contained in the prior art. *Atlas Powder Co. v. Ireco, Inc* 51 USPQ2d 1943 (Fed. Cir. 1999).

13. Therefore, Crowell anticipates the instantly rejected claims.

Conclusion

14. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

15. A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

16. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kyle A. Purdy whose telephone number is 571-270-3504. The examiner can normally be reached from 9AM to 5PM.

17. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Sharmila Landau, can be reached on 571-272-0614. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

18. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

*/Kyle Purdy/
Examiner, Art Unit 1611
August 9, 2010*

*/Sharmila Gollamudi Landau/
Supervisory Patent Examiner, Art Unit 1611*